

What role does sustainability play in food-processing occupations?

The processes of producing, processing and consuming food have a substantial influence on the sustainable development of our society. For example, the consumption of regional and seasonal food can lead to a reduction of emissions. The fair production of raw materials can also support social equality on a global scale. Moreover, waste reduction plays a key role in the production of sustainable food, also from an economic point of view.

To achieve this, experts in artisanal food production and food industry occupations need sustainability-oriented professional skills. These skills can be fostered by vocational education and training. For example, bakers and milk technologists can pass on the sustainability potential of their respective occupations to the next generation in training.

Some trends and competence requirements relevant to sustainability are described below for two sample occupations in the food sector. In addition, possible connections to the framework training plan are provided. The information presented is based on the results of pilot projects carried out within the scope of the funding focus "Vocational education and training for sustainable development" (Funding Line III) and its scientific supervision (Münster University of Applied Sciences/University of Hamburg).

Vocational education and training for sustainable development at BIBB

Division 4.2

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Latest information on vocational education and training for sustainable development:

www.bbne.de

Sustainability in training practices:

www.foraus.de/bbne

Vocational education and training for sustainable development on Twitter:

[@BIBB_nachhaltig](https://twitter.com/BIBB_nachhaltig)

The pilot projects are financed by BIBB using funding provided by the Federal Ministry of Education and Research (BMBF).

Last revised: November 2020



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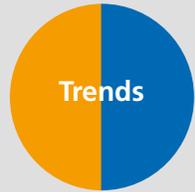
Sustainability in artisanal food production and the food industry

Trends and competencies



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Legend



Trends

More and more trends are emerging in the area of sustainable nutrition. These trends have a particular impact on occupations in artisanal food production and the food industry.



Competencies

To pick up on these trends, while at the same time playing a role in shaping sustainable nutrition, all employees in this sector need sustainability-oriented skills. The potential that is already available in the respective occupations should be used.



The occupational profile items from the framework training plans provide orientation for potential connections to promote sustainability-oriented skills. Related occupations may also benefit from these ideas.

"Bread is our staple food. As a large-scale bakery, we are committed towards our customers and to a sustainable approach in all our operations along the value chain. In training units our trainees learn where and how to contribute, for example by not wasting any water, electricity or raw materials."

Benjamin Riewesell, personnel officer
Harry-Brot GmbH (partner company in "NaReLe" pilot project)

Artisanal food production

Baker

There is an increasing demand for take-away snacks and meals

Choose environmentally friendly single-use or reusable packaging solutions for take-away food

Prepare snacks using regional or seasonal raw products



Section 5 Item 4 Environmental protection
Section 5 Item 10 Providing and using packaging materials
Section 5 Item 20 Producing baked snacks

Healthy nutrition is increasingly becoming a "lifestyle"

Revise recipes to increase the level of healthy nutrition (e.g. reducing the quantity of salt, sugar or animal fats, while increasing fibre)

Explain the health-related properties of wholemeal products and incorporate the advantages into sales promotion measures



Section 5 Item 9 Customer service and sales
Section 5 Item 19 Designing and producing cakes and desserts
Section 5 Item 21 Producing small meals using fresh raw products

Preserving tradition is becoming increasingly important for customers and experts

Know, draw on and communicate the strengths of the traditional artisanal sector (e.g. pay attention to individual customer wishes, promote regional value creation)

Use traditional dough and sour dough leavening processes to produce high-quality and aromatic breads



Section 5 Item 9 Customer service and sales
Section 5 Item 13 Producing bread and biscuits
Section 5 Item 20 Producing baked snacks

Food industry

Food technology specialist

Counteract food waste during production

Use planning systems to calculate the optimum quantities and reduce food waste

Use resource-efficient production processes and innovative warehouse logistics



Section 3 Item 4 Environmental protection
Section 3 Item 7 Receiving orders, planning and organising work
Section 3 Item 11 Storing materials and products

Customers increasingly pay attention to sustainability seals and labels

Compare and assess sustainability seals and labels

Take account of social and ecological effects when procuring raw products



Section 3 Item 4 Environmental protection
Section 3 Item 6 Quality management
Section 3 Item 8 Providing and preparing raw materials, additional products, auxiliary materials and semi-finished products

There is an increasing demand for plant-based foods

Know the processing properties of plant-based raw products (e.g. nuts, pulses and mushrooms) and use them for product innovations

Compare the carbon footprint of vegetable and animal raw products



Section 3 Item 5 Operational and technical communication
Section 3 Item 8 Providing and preparing raw materials, additional products, auxiliary materials and semi-finished products
Section 3 Item 9 Steering production processes